

Name: _____ Date: August 10 Block: _____

Intro to Unit Conversions Homework – Due Monday, August 13th

For each of the following, convert to the new unit.

Show all work using correct dimensional analysis to get full credit.

1. 18000 seconds = 300 minutes

2. 43 hours = 2580 minutes

3. 16000 ounces = 1000 pounds

4. 4.1 tons = 8200 pounds

5. 850 yd = 2550 feet

6. 1250 yd = .7102 miles

7. 1.25 years = 657,000 minutes

8. 566,000 seconds = 6.6 days

Use these set-ups to get started, then draw your own.

7.
$$\frac{1.25 \text{ yrs}}{1 \text{ yr}} \times \frac{365 \text{ days}}{1 \text{ day}} \times \frac{24 \text{ hrs}}{1 \text{ hr}} \times \frac{60 \text{ min}}{1 \text{ min}} = 657,000 \text{ min}$$

5.
$$\frac{850 \text{ yd}}{1 \text{ yd}} \times \frac{3 \text{ ft}}{1 \text{ ft}} = 2550 \text{ ft}$$

8.
$$\frac{566,000 \text{ sec}}{60 \text{ sec}} \times \frac{1 \text{ min}}{60 \text{ min}} \times \frac{1 \text{ hr}}{24 \text{ hrs}} \times \frac{1 \text{ day}}{1 \text{ day}} = 6.6 \text{ days}$$

6.
$$\frac{1250 \text{ yd}}{1 \text{ yd}} \times \frac{3 \text{ ft}}{1 \text{ ft}} \times \frac{1 \text{ mile}}{5280 \text{ ft}} = .7102 \text{ miles}$$

